

REMARKS

The three-month period for responding to the initial Office Action in this application expired on Saturday, October 29, 2005. Accordingly, this Amendment, which is being filed with a Certificate of Mailing on Monday, October 31, 2005, is timely filed.

Under cover of a separate letter to the Official Draftsperson, corrected replacement drawing sheets 1/7 and 5/7 are being submitted. On these replacement sheets, Fig. 1 is being labeled as PRIOR ART, and, in Figure 9, the longitudinal cutting line shown in phantom is being labeled as a-a to be consistent with the specification at page 9, line 21. Entry and approval of the replacement drawing sheets are respectfully requested.

By this Amendment, claims 1, 6 and 7 are being amended to more particularly point out and distinctly claim the subject invention. The addition of "new matter" has been scrupulously avoided. Claims 1-7 remain in this case.

In the initial Office Action, original Figure 1 was objected to because it lacked a designation as PRIOR ART. In addition, claim 7 was objected to under 35 U.S.C. 112 because of a typographical error. Both of these informalities have been corrected herein.

The Examiner also rejected claim 6 under 35 U.S.C. §112 because of insufficient antecedent basis for the phrase "the point elastic floor". The rejection is respectfully traversed.

Claim 6 depends from claim 5 which, in turn, depends from independent claim 1. The phrase "a point elastic floor" appears in line 3 of claim 1, and thereby provides clear antecedent basis for use of this phrase in dependent claim 6. Accordingly, the Examiner is requested to reconsider and withdraw this rejection.

Claims 1-6 stand rejected under 35 U.S.C. 103(a) as allegedly obvious over Applicant's prior art (Fig. 1) in view of U.S. Patent No. 4,685,259 to Eberhart et al. Claim 7 stands rejected on the same grounds, further in view of U.S. Patent No. 6,871,368 to Sabados. These rejections are respectfully, but most strenuously traversed for the following reasons.

The present invention is directed to a combined elastic sports floor of modular design and specified construction which is advantageously employed to equip sports facilities cost efficiently, to allow the installation and disassembly of the flooring as needed without requiring permanent structures, and to guarantee shock and stress absorption to avoid athlete injury and discomfort.

The surface area of sports facilities are generally very large, covering several hundred square meters, and the sports floor are subjected to significant use and stress given the movements of athletes in professional sports such as handball, volleyball, basketball, etc. Sports flooring is therefore a highly technical product which is a specialty and which is entirely different from regular flooring which is used in other applications.

The assignee of the present application has an excellent reputation on an international level in producing and installing such sports flooring. It is one of the favored suppliers of the International Olympic Committee and it has provided sports flooring for the Olympic games regularly for decades. Accordingly, the Applicant is intimately familiar with the limitations of existing sports floors. These limitations are fully described in the introductory portion of the specification of this application. The limitations include the environmental impact of humidity and heat on wood panels of prior combined elastic sports floors as well as installation time and skill constraints and issues of expense.

The present invention overcomes all of these drawbacks of the prior construction while also facilitating industrial manufacturing, and modular assembly on site in the sports facility.

To these ends, the present invention provides a new combined elastic sports floor employing modules, and in particular first and second subassemblies. Each subassembly includes an intermediate element comprising a median honeycomb structure sandwiched between two stiffening plates made of non-woven material which is reinforced and stiffened by warp and weft threads.

A first of these intermediate elements is secured to a base component of polyurethane foam to form the first subassembly. The second intermediate element is associated with a top point elastic floor to define the second subassembly.

The first and second subassemblies are secured one to the other to form a complete modular element by connecting means with an angular orientation offset in order to define contact surfaces and facilitate interlocking assembly of multiple modular elements into the combined elastic sports floor.

There is no teaching, disclosure or suggestion of this claimed construction of a combined elastic sports floor as defined by amended claim 1, in the applied prior art.

Fig. 1 of the present application depicts an earlier proposed combined elastic sports floor which includes two tiers of wood panels sandwiched between a layer of polyurethane foam and a top point elastic floor. Applicant has recognized the drawbacks of this earlier design and has invented a new combined elastic sports floor which significantly reduces installation time and expertise, avoids the deleterious effects of humidity and heat on the wood panels of the prior construction and provides excellent sporting properties.

There is no recognition of these limitations of the prior approach or suggestion of Applicant's solution in the applied prior art.

The Eberhart et al. patent is directed to acoustic flooring aiming to improve sound insulation, and not to sports flooring. The purpose of the sound rated floor system of this earlier patent is sound attenuation and there is no suggestion in this reference of applying the disclosed construction for the purposes of building and installing a sports floor.

The preferred construction of the sound rated floor system of Eberhart et al. comprises a paper honeycomb core with acoustically semi-transparent facings of fiberglass bonded to first and second sides of the core. A rigid layer comprising glass reinforced concrete boards, a reinforced mortar bed or wood surface such as plywood, is positioned on one of the sound attenuation layers. This acoustic panel is intended for use between sub-flooring and a finished covering such as ceramic tile, vinyl tile or hardwood finish. There is no suggestion in this reference of applying the acoustic panel in place of the wood panel of the earlier combined elastic sports floor. The whole purpose of the honeycomb panel of Eberhart et al. is to acoustically isolate a room beneath his floor. Sports floors typically have no such specification.

Not only is there no suggestion in the applied prior art for combining the different purpose floor structures, their combination would still not produce the invention as claimed. Nowhere does the Eberhart et al. patent show a honeycomb structure between two stiffening plates which are themselves configured in a particular manner with warp and weft thread reinforcement. Also, there is no suggestion in the secondary reference of using a pair of such honeycomb structures, as required by independent claim 1.

Moreover, the structure described in the Eberhart et al. patent is a permanent structure which is assembled on site. There is no way to produce modular assemblies industrially which can be transported in subassemblies, as provided by the present invention.

For all of the above reasons, Applicant respectfully submits that the combination of the sound rated floor system of Eberhart et al. with the prior art combined elastic sports floor of Figure 1 of the present application, is tenuous at best, and still would not produce the invention as claimed.

The tertiary reference which relates to a protective barrier for the bottom of swimming pools fails to overcome the above-described deficiencies of the basic combination of references. Accordingly, all of the claims in this application are believed to be in condition for allowance and such action is respectfully requested.

If it would advance the prosecution of this application, the Examiner is cordially invited to contact Applicant's representative at the below indicated telephone number.

Respectfully submitted,

A handwritten signature in black ink, reading "Jeff Rothenberg". The signature is fluid and cursive, with a long horizontal stroke at the end.

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